

Title (en)  
DIRECTIONAL BACKLIGHT

Title (de)  
DIREKTIONALE RÜCKBELEUCHTUNG

Title (fr)  
RÉTROÉCLAIRAGE DIRECTIONNEL

Publication  
**EP 2850486 B1 20191225 (EN)**

Application  
**EP 13790141 A 20130515**

Priority

- US 201261648840 P 20120518
- US 201261648942 P 20120518
- US 201261649050 P 20120518
- US 201261649116 P 20120518
- US 201261649054 P 20120518
- US 201261649136 P 20120518
- US 2013041192 W 20130515

Abstract (en)  
[origin: US2013308339A1] Disclosed is a light guiding valve apparatus including at least one transparent stepped waveguide optical valve for providing large area collimated illumination from localized light sources, and at least one further illumination source. A stepped waveguide may be a stepped structure, where the steps include extraction features hidden to guided light, propagating in a first forward direction. Returning light propagating in a second backward direction may be refracted, diffracted, or reflected by the features to provide discrete illumination beams exiting from the top surface of the waveguide. Such controlled illumination may provide for efficient, multi-user autostereoscopic displays as well as improved 2D display functionality. Light from a separate illumination source may pass through the transparent stepped waveguide optical valve to provide at least one further additional illumination function.

IPC 8 full level  
**G02B 27/22** (2018.01); **F21V 8/00** (2006.01); **G02F 1/1335** (2006.01); **G09G 3/20** (2006.01)

CPC (source: CN EP US)  
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**US 201313838936 A 20130315**; AU 2013262869 A 20130515; CN 201380026058 A 20130515; CN 201910738927 A 20130515; EP 13790141 A 20130515; JP 2015512794 A 20130515; KR 20147035111 A 20130515; US 2013041192 W 20130515; US 201514821515 A 20150807